

Title (en)  
Radiation-controllable thyristor.

Title (de)  
Durch Strahlung steuerbarer Thyristor.

Title (fr)  
Thyristor contrÔlable par radiation.

Publication  
**EP 0108874 A1 19840523 (EN)**

Application  
**EP 83108506 A 19830829**

Priority  
• JP 19996182 A 19821115  
• JP 19996282 A 19821115

Abstract (en)  
A radiation-controllable thyristor is disclosed, which includes an electrical trigger main thyristor (32) having four semiconductor layers (22, 24, 26, 30a) each having mutually different conductivity types, and a plurality of stages of pilot thyristors (38-1, 38-2, 38-3) commonly having three other layers (22, 24, 26) excluding one emitter layer (30a) of the above main thyristor. First-stage one of the pilot thyristors is a light-triggering type thyristor (38-1) having a photosensing area onto which a control radiation, such as light ( $h\nu$ ) beam, is irradiated. A collector electrode (36) is provided on another emitter layer (26) of the main thyristor (32) in such a way as to substantially surround the above pilot thyristors (38-1, 38-2, 38-3).

IPC 1-7  
**H01L 29/60**; **H01L 29/743**; **H01L 31/10**

IPC 8 full level  
**H01L 29/74** (2006.01); **H01L 31/111** (2006.01)

CPC (source: EP US)  
**H01L 29/7428** (2013.01 - EP US); **H01L 31/1113** (2013.01 - EP US)

Citation (search report)  
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DOCDB simple family (publication)  
**EP 0108874 A1 19840523**; **EP 0108874 B1 19871125**; CA 1188820 A 19850611; CS 254968 B2 19880215; CS 664983 A2 19870716; DE 3374740 D1 19880107; US 4595939 A 19860617

DOCDB simple family (application)  
**EP 83108506 A 19830829**; CA 436498 A 19830912; CS 664983 A 19830913; DE 3374740 T 19830829; US 52747783 A 19830829